

TECHNICAL MEMORANDUM

Utah Coal Regulatory Program

September 27, 2010

TO: Internal File

THRU: Ingrid Campbell, Lead *IC*

FROM: Steve Christensen, Environmental Scientist *SCC*

RE: Incidental Boundary Change, West Ridge Resources, West Ridge Mine, Permit # C/007/0041 and Project #3608

SUMMARY:

On August 30th, 2010, the Division of Oil, Gas and Mining (the Division) received an amendment from West Ridge Resources (the Permittee). The amendment details an Incidental Boundary Change (IBC) of 20.3 acres of newly acquired Penta Creek Fee Lease to the existing permit area.

The mining within the proposed IBC will occur under approximately 3,000 feet of overburden. No additional surface disturbance is proposed with this amendment. Additional hydrologic baseline information and/or water monitoring is not required. The proposed IBC is located within the current Cumulative Impact Area (CIA) and has been analyzed/reviewed for coal mining activity in the mine-sites Probable Hydrologic Consequences Determination and Cumulative Hydrologic Impact Assessment (CHIA). Additionally, the mining to occur within the proposed IBC will be development mining only. Full extraction mining will not be implemented in the proposed expansion area.

The amendment meets the hydrologic requirements of the State of Utah R645-Coal Mining Rules and is recommended for approval.

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TECHNICAL ANALYSIS:

ENVIRONMENTAL RESOURCE INFORMATION

Regulatory Reference: Pub. L 95-87 Sections 507(b), 508(a), and 516(b); 30 CFR 783., et. al.

HYDROLOGIC RESOURCE INFORMATION

Regulatory Reference: 30 CFR Sec. 701.5, 784.14; R645-100-200, -301-724.

Analysis:

The amendment meets the Hydrologic Resource Information requirements of the State of Utah R645-Coal Mining Rules.

No additional sampling and water monitoring (ground and surface water) of hydrologic resources is required with the proposed IBC. The previously approved 1986 Seep and Spring Inventory (See Appendix 7-6) examined the proposed IBC and did not identify any seeps and springs in the area. Additionally, no ground or surface water resources have been identified within the proposed IBC.

The proposed IBC is located within the current CIA. As a result, the area has been previously reviewed/analyzed in the CHIA for impacts within the permit and adjacent area.

The Probable Hydrologic Consequences Determination of the Mining and Reclamation Plan (MRP) does not require revision at this time. As discussed above, the proposed IBC area has been previously evaluated. Additionally, with no hydrologic resources located within the proposed IBC and no additional surface disturbance associated with the proposed expansion, the potential for hydrologic consequences is minimal.

Furthermore, the mining to occur within the proposed IBC will be development mining only. Full extraction mining will not be implemented in the proposed expansion area.

Findings:

The amendment meets the Hydrologic Resource Information requirements of the State of Utah R645-Coal Mining Rules.

OPERATION PLAN

HYDROLOGIC INFORMATION

Regulatory Reference: 30 CFR Sec. 773.17, 774.13, 784.14, 784.16, 784.29, 817.41, 817.42, 817.43, 817.45, 817.49, 817.56, 817.57; R645-300-140, -300-141, -300-142, -300-143, -300-144, -300-145, -300-146, -300-147, -300-148, -301-512, -301-514, -301-521, -301-531, -301-532, -301-533, -301-536, -301-542, -301-720, -301-731, -301-732, -301-733, -301-742, -301-743, -301-750, -301-761, -301-764.

Analysis:

General

The amendment meets the Hydrologic Information requirements of the State of Utah R645-Coal Mining Rules.

The proposed IBC is located within the currently approved CIA and CHIA. As a result, the potential impacts of coal mining activity within this area have been evaluated. The 1986 Seep and Spring Inventory (See Appendix 7-6) examined the proposed IBC area. No seeps/springs were identified within the proposed IBC. Additionally, no surface water resources have been identified within the proposed IBC. As a result, additional ground and surface water monitoring is not required with the proposed amendment.

As no additional surface disturbance is proposed with the IBC, the requirements relative to diversions, stream buffer zones, sediment control measures, siltation structures (impoundments, banks, dams etc.) are not applicable.

Furthermore, the mining to occur within the proposed IBC will be development mining only. Full extraction mining will not be implemented in the proposed expansion area.

Findings:

The amendment meets the Hydrologic Information requirements of the State of Utah R645-Coal Mining Rules.

RECLAMATION PLAN

HYDROLOGIC INFORMATION

Regulatory Reference: 30 CFR Sec. 784.14, 784.29, 817.41, 817.42, 817.43, 817.45, 817.49, 817.56, 817.57; R645-301-512, -301-513, -301-514, -301-515, -301-532, -301-533, -301-542, -301-723, -301-724, -301-725, -301-726, -301-728, -301-729, -301-731, -301-733, -301-742, -301-743, -301-750, -301-751, -301-760, -301-761.

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Analysis:

Hydrologic Reclamation Plan

The amendment meets the Hydrologic Reclamation Plan requirements of the State of Utah R645-Coal Mining Rules.

No additional surface disturbance is planned with the proposed IBC. As a result, the Hydrologic Reclamation Plan requirements do not require revisions at this time.

Findings:

The amendment meets the Hydrologic Reclamation Plan requirements of the State of Utah R645-Coal Mining Rules.

CUMULATIVE HYDROLOGIC IMPACT ASSESSMENT

Regulatory Reference: 30 CFR Sec. 784.14; R645-301-730.

Analysis:

The amendment meets the Cumulative Hydrologic Impact Assessment (CHIA) requirements of the State of Utah R645-Coal Mining Rules.

The IBC is within the existing CHIA and has been evaluated for potential mining induced impacts to the hydrologic balance within the cumulative impact area. Due to the extensive ground cover in the area of the IBC (>3,000 feet), the potential for subsidence induced to surface water resources is minimal.

Findings:

The amendment meets the Cumulative Hydrologic Impact Assessment (CHIA) requirements of the State of Utah R645-Coal Mining Rules.

RECOMMENDATIONS:

The amendment meets the Hydrologic Requirements of the State of Utah R645-Coal Mining Rules and should be approved.